REQUEST FOR PROPOSALS

MARICOPA ASSOCIATION OF GOVERNMENTS (MAG) E 9-1-1 SYSTEM PERFORMANCE REVIEW



November 2000

CONTENTS

Section		<u>Page No.</u>
PUBLIC NOTICE		i
SCOPE OF WORK		1
PROPOSAL REQUIREME	NTS	6
PROPOSAL EVALUATION	N AND SELECTION PROCESS	9
ADMINISTRATIVE REQU	UREMENTS	10
APPENDIX A:	ARIZONA ADMINISTRATIVE CODE R4-30-301	
APPENDIX B:	LABOR COST ALLOCATION BUDGET	
APPENDIX C:	PROPOSER'S REGISTRATION FORM	
APPENDIX D.	PROGRESS REPORT FORMAT	

PUBLIC NOTICE

REQUEST FOR PROPOSALS:

MAG E 9-1-1 SYSTEM PERFORMANCE REVIEW

The Maricopa Association of Governments (MAG) is requesting proposals from qualified consultants for the review of the MAG Enhanced 911 Emergency Telephone System to make a determination of the availability or possible direction for enhancement of its existing day-to-day System Management. The estimated time frame for this project is approximately four months from the date of the notice to proceed.

Detailed proposal requirements may be obtained by contacting the MAG Office at the address indicated below or by visiting the MAG Website at www.mag.maricopa.gov/Newpages/rfp.htm. For further information, please contact Mary Dysinger-Franklin at (602) 262-6260, or by e-mail at mfrankli@ci.phoenix.az.us.

Proposals will be accepted until 12:00 noon (Mountain Standard Time) on January 5, 2001, at MAG, 302 North 1st Avenue, Suite 300, Phoenix, Arizona 85003.

SCOPE OF WORK

Introduction

The Maricopa Association of Governments (MAG) is requesting proposals from qualified consultants for the review of the MAG Enhanced 911 Emergency Telephone System to make a determination of the availability or possible direction for enhancement of its existing day-to-day System Management. Through a revolving fund administered by the Arizona Department of Transportation (ADOA), the MAG region receives funding for operating the 911 Emergency Telephone System. Payment shall be made to the consultant by the ADOA for work deemed acceptable by MAG. The Phoenix Fire Department presently administers the contract for customer premises equipment (CPE) and network facilities for the public safety answering points (PSAPs) within the MAG Maricopa County System. The system review must support growth and flexibility to meet the individual operational demands of the agencies within the system.

The objectives of the project are to review and provide recommendation(s) relating to:

(The items listed are not in a prioritized order but should include)

1. Existing PSAP operations

Staffing

Call Overflow

Backup Procedures

Call Routing

Network loading/trunking

Disaster Recovery

CPE Maintenance

Regional Standards – Operational / Performance (PSAP Handbook)

Operational Standards/Training/Certification Issues (APCO/NENA/CALEA/etc.)

2. Existing maintenance contract

Costs

Software Replacement/Maintenance

Overall coverage – replacement parts, replacement cycle

3. Master Street Address Guide Management

ANI/ALI/MSAG Ledger

4. Network Interconnection

Network System Upgrade/Transition (SS-7 Migration)

Network Funding

Network Interconnection Arrangements – CLEC/LEC/Wireless

5. Administration Staffing/Support Requirement(s)

Billing Relationships/new & existing providers

Network / Database Costs

Maintenance Cost(s)

Overall System Administration/Management

CPE Performance

CPE Enhancements (life cycle/replacement)
"Other" Maintenance Issues
Overall System Performance Tracking/Evaluation
Funding/Policies

- 6. Local Number Portability (Impact/Opportunity Status)
- 7. N-1-1 (Impact/Opportunity Status)
- 8. Wireless Integration Phase I
- 9. Wireless Integration Phase II

Proposed Tasks

The consultant is encouraged to be creative in developing a sound analytical approach which achieves the goals for this project. The consultant is urged to be as specific as possible when describing the activities that will be performed to support each task. The consultant is also urged to make maximum use of matrices, tables and drawings in working papers produced for the project to insure conciseness and clarity and to minimize the amount of text required. In preparing a proposal for consideration by MAG, the consultant will not be required to adhere strictly to the proposed tasks specified below. Additional tasks may be warranted.

Task 1 Refine Scope of Work

Throughout the course of this project, inquiry and discussion may result in some revisions to the Scope of Work and Project Schedule. As necessary, the consultant will refine the Scope of Work for this project based upon professional experience and input from MAG. This work will be performed under the general direction of the MAG project manager. The consultant will prepare documentation of any such revision, including a revised labor/dollar allocation and project task cost breakdown, and submit the revision to MAG for approval.

Task 2 Conduct Technology Review

The consultant will conduct a technology review and document the results. This review should include at a minimum: What PSAP equipment is currently available? What equipment is optional but desired for this technology? What training is offered?

The consultant will also address: What are the future trends in emergency systems management next year and in the next five years? What is the best way to insure that the equipment obtained does not become obsolete and can be adapted to new technology? What operational standards exist or are emerging? Are there any caveats regarding the use of specific emergency communications systems or equipment?

<u>Task 3</u> Conduct Implementation Review

The consultant will conduct a review and document the results. This review should include at a minimum: What clients have the equipment identified in Task 2 and how do they use it? What do the clients see as the pros and cons of their programs? Are there lessons to be learned?

<u>Task 4</u> <u>Inventory Member Agency Facilities</u>

The consultant will conduct an inventory of the existing equipment and facilities currently available at MAG member agencies. The member agencies include 24 cities and towns, two Indian Communities and Maricopa County.

<u>Task 5</u> <u>Determine Member Agency Preferences</u>

Working with member agencies, the consultant will identify additional equipment, facilities, training and other needs required to improve the operation of the system.

<u>Task 6</u> <u>Determine System Needs and Support</u>

The consultant will document any other needs and support needed to provide an efficient and effective system in the region. In particular, the consultant will identify requirements at the administrator, user and local levels, communications methods, as well as staff and professional support needed to implement the system.

Task 7 Identify and Evaluate Alternatives

The consultant will identify alternatives. The alternatives will be evaluated in terms of the extent to which they achieve program goals, ease of use, adaptability to changing technology, cost and any other factors deemed appropriate.

<u>Task 8</u> <u>Develop a Recommendation for the Region</u>

Based on the evaluation conducted in Task 7, and input from MAG, the consultant will develop a recommendation for the Region. A matrix will be prepared which summarizes the advantages and disadvantages of each alternative as defined in Task 7 to provide an understanding of how the final recommendation was derived.

<u>Task 9</u> <u>Develop an Implementation Plan</u>

The consultant will prepare an implementation plan that identifies what needs to be done to carry out the recommended system changes. The implementation plan will identify at a minimum what needs to be purchased, where it should be placed, a schedule for implementing the changes and the training programs that should be established.

Deliverable Products

The products of this project are listed below. Each working paper should present information in a succinct manner with extensive use of tables, matrices and drawings. The working papers ultimately will be consolidated into a final report. An administrative draft of each working paper will be submitted in both electronic and hard copy format to the MAG project manager for review. Comments from the MAG project manager will be incorporated into the working paper by the consultant, before it is distributed for external review. Comments received during the external review process will be incorporated into the working paper by the consultant, which will then become a chapter in the draft final report.

- 1. Working Paper 1, Revised Scope of Work and Project Schedule, listing specific project tasks and a schedule for completion of each task (An administrative draft for review in electronic and hard copy format; and one electronic version and five hard copies of the revised Scope of Work and Project Schedule).
- 2. Working Paper 2, Technology Review (one initial administrative draft in electronic and hard copy format for MAG review; and one electronic version and 25 copies of the revised Working Paper).
- 3. Working Paper 3, PSAP Review (one initial administrative draft in electronic and hard copy format MAG review; and one electronic version and 25 copies of the revised Working Paper).
- 4. Working Paper 4, Member Agency Facilities (one initial administrative draft in electronic and hard copy format for MAG review; and one electronic version and 25 copies of the revised Working Paper).
- 5. Working Paper 5, Member Agency System Needs (one initial administrative draft in electronic and hard copy format for MAG review; and one electronic version and 25 copies of the revised Working Paper).
- 6. Working Paper 6, System Network Needs and Support (one initial administrative draft in electronic and hard copy format for MAG review; and one electronic version and 25 copies of the Revised Working Paper).
- 7. Working Paper 7, Operational Alternatives (one initial administrative draft in electronic and hard copy format for MAG review; and one electronic version and 25 copies of the Revised Working Paper for distribution).
- 8. Working Paper 8, Recommendation (one initial administrative draft in electronic format and hard copy for MAG review; and one electronic version and 25 copies of the Revised Working Paper for distribution).
- 9. Working Paper 9, Implementation Plan (one initial administrative draft in electronic and hard copy format for MAG review; and one electronic version and 25 copies of the Revised Working Paper for distribution).
- 10. Final Report with Executive Summary (one camera-ready original, one copy in electronic format and 30 bound copies of the full report with executive summary, plus 30 additional copies of the Executive Summary).

PROPOSAL REQUIREMENTS

Project Cost and Schedule

The estimated time frame for this project is four months from the date of the notice to proceed, with intermediate deliverables due in accordance with the schedule as agreed to between MAG and the consultant(s). The date of the notice to proceed is anticipated to be April 2, 2001.

Proposal Delivery

1. Fifteen (15) copies of the proposal must be submitted by 12:00 p.m. (Mountain Standard Time) on January 5, 2001.

Maricopa Association of Governments Attention: Mary Dysinger-Franklin 302 North 1st Avenue, Suite 300 Phoenix, Arizona 85003

Timely receipt of proposals will be determined by the date and time the proposal is received at the above address. Hand delivery is therefore encouraged.

Proposals will be opened publicly and the name of each entity submitting a proposal will be read at 2:00 p.m. on January 5, 2001 at the MAG Offices, Palo Verde Room, 302 North 1st Avenue, Suite 200 Phoenix, Arizona, 85003.

All material submitted in response to this solicitation becomes the property of MAG and will not be returned.

- 2. Any questions regarding this Request for Proposals should be directed to Mary Dysinger-Franklin, 911 Coordinator, 150 S. 12th Street, Phoenix, AZ 85034. Ms. Dysinger-Franklin may be contacted by telephone, at (602) 262-6260; or by email, at mfrankli@ci.phoenix.az.us. Additional information regarding MAG activities, including Committee meeting schedules, may be found on the web site (http://www.mag.maricopa.gov).
- 3. A proposer's conference for the project has been scheduled for 9:00 a.m., December 4, 2000 at the MAG Office, Palo Verde Room, Suite 200, 302 North 1st Avenue, Phoenix, Arizona.

Proposal Content

It is required that the proposal:

- 1. Be limited to a maximum length of twenty (20) pages, including a cover letter, résumés, and any appendices. The cover letter must be signed by a party authorized to bind the entity submitting the proposal.
- 2. Be prefaced by a brief statement describing the proposer's organization and outlining its approach to completing the work required by this solicitation. This statement shall illustrate the proposer's overall understanding of the project.
- 3. Contain a work plan which concisely explains how the consultant will carry out the objectives of the project. In the work plan, the proposer shall describe each project task and proposed approach to the task as clearly and thoroughly as possible.
- 4. Include a preliminary schedule for the project in bar-chart format. Indicate all work plan tasks and their durations. The schedule shall clearly identify project deliverable dates.
- 5. Contain a staffing plan for the project. The plan shall include the following in table format:
 - a. A project organization chart, identifying the Project Manager.
 - b. Names of key project team members and/or subconsultants. Only those personnel who will be working directly on the project should be cited.
 - c. The role and responsibility of each team member.
 - d. Percent effort (time) of each team member for the contract period.
 - e. The role and level of MAG technical staff support, if any.
- 6. Include résumés for major staff members assigned to the project. These résumés should focus on their experience in this type of project.
- 7. Each firm submitting a proposal is required to certify that it will comply with, in all respects, the rules of professional conduct set forth in A.C.R.R. R4-30-301 (see Appendix A), which is the official compilation of Administrative Rules and Regulations for the State of Arizona.
- 8. Include proposer's recent experience (last five years) in performing work similar to that anticipated herein. This description shall include the following:
 - a. Date of project.
 - b. Name and address of client organization.
 - c. Name and telephone number of individual in the client organization who is familiar with the project.

- d. Short description of project.
- e. Consultant team members involved and their roles.
- 9. A labor cost allocation budget formatted as noted in Appendix B.
- 10. All firms proposing on this project will be required to include a "*Proposer's Registration Form*" (See Appendix C) in the submitted proposal. In addition, a "*Proposer's Registration Form*" is required to be included for each subcontractor proposed for this project.
- 11. Each firm shall document within its proposal any potential conflicts of interest. A conflict of interest shall be cause for disqualifying a consultant from consideration. A potential conflict of interest includes, but is not limited to:
 - a. Accepting an assignment where duty to the client would conflict with the consultant's personal interest, or interest of another client.
 - b. Performing work for a client or having an interest which conflicts with this contract.
 - c. Employing personnel who worked for MAG or one of its member agencies within the past three years.

MAG will be the final determining body as to whether a conflict of interest exists.

PROPOSAL EVALUATION AND SELECTION PROCESS

- 1. All proposals will be evaluated by an evaluation group. Evaluation criteria include the following:
 - a. Demonstrated understanding of the project through a well-defined work plan consistent with program objectives.
 - b. Clarity of proposal, realistic approach, technical soundness, and enhancements to elements outlined in this Request for Proposals.
 - c. Experience of Project Manager and other project personnel in similar studies. Only those personnel assigned to work directly on the project should be cited.
 - d. Proven track record in this area of study. Proposers should identify the principal people who worked on past projects and the amount of time they devoted to the work effort.
 - e. Availability of key personnel throughout the project effort.
 - f. Price, except for the procurement of architectural or engineering (A&E) services.
 - g. Ability and commitment to complete the project within the specified time period, meet all deadlines for submitting associated work products, and insure quality control.
 - h. Recognition of work priorities and flexibility to deal with change and contingencies.
- 2. On the basis of the above evaluation criteria, selected firms submitting proposals may be interviewed prior to the selection of a consultant. MAG strongly suggests that the Project Manager and key members of the consultant team be present at the interview.
- 3. MAG may conduct discussions with offerors who submit proposals determined to be reasonably susceptible of being selected for award.
- 4. MAG reserves the right to:
 - a. Cancel this solicitation.
 - b. Reject any and all proposals and re-advertise.
 - c. Select the proposal(s) that, in its judgment, will best meet its needs.
 - d. Negotiate a contract that covers selected parts of a proposal, or a contract that will be interrupted for a period or terminated for lack of funds.

ADMINISTRATIVE REQUIREMENTS

- 1. This Request for Proposals is for a cost-reimbursement plus fixed fee contract.
- 2. During the course of the project, a monthly progress report is required to be submitted within ten (10) working days after the end of each month until the final report is submitted. Each report shall include a comprehensive narrative of the activities performed during the month, an estimated percent complete for each project task, monthly and cumulative costs by task, activities of any subcontractors, payments to any subcontractors, a discussion of any notable issues or problems being addressed, and a discussion of anticipated activities for the next month (See Appendix D for format).
- 3. MAG shall retain ten percent (10%) of the contract amount, withheld from each invoice, as final payment until completion of the project to the satisfaction and acceptance of the work. Final payment shall be made after acceptance of the final product and invoice.
- 4. An audit examination of the consultant's records may be required.
- 5. The firm that is selected will be required to comply with Titles VI and VII of the Civil Rights Act of 1964. The contractor will comply with Executive Order 11246, entitled Equal Employment Opportunity, as amended by Executive Order 11375 and as supplemented in Department of Labor Regulations (41 CFR Part 60). The contractor will also be required to comply with all applicable laws and regulations of the U.S. Department of Transportation.
- 6. The firm selected will be required to comply with MAG insurance requirements, which may include: Workmen's Compensation, Architects and Engineers Professional Liability insurance, Comprehensive General Liability insurance, Business Automobile Liability insurance, and Valuable Papers insurance.
- 7. The firm selected is required to document any potential conflicts of interest during the contract period. A conflict of interest shall be cause for terminating a contract. A potential conflict of interest includes, but is not limited to:
 - a. Accepting an assignment where duty to the client would conflict with the consultant's personal interest, or interest of another client.
 - b. Performing work for a client or having an interest which conflicts with this contract.
 - c. Employing personnel who worked for MAG or one of its member agencies within the past three years.

MAG will be the final determining body as to whether a conflict of interest exists.

APPENDIX A

ARIZONA ADMINISTRATIVE CODE R4-30-301

CH. 30 BOARD OF TECHNICAL REGISTRATION

R4-30-301

ARTICLE 3. REGULATORY PROVISION

R4-30-301. Rules of professional conduct:

- A. All registrants shall comply substantially with the following standards of professional conduct:
 - 1. A registrant shall not submit any materially false statements or fail to disclose any material facts requested in connection with his application for certification.
 - 2. A registrant shall not engage in fraud, deceit, misrepresentation, or concealment of material facts in advertising, soliciting, or providing professional services to members of the public.
 - 3. A registrant shall not knowingly sign, stamp, or seal any plans, drawings, blueprints, land surveys, reports, specifications, or other documents not prepared by the registrant or his bona fide employee.
 - 4. A registrant shall not knowingly commit bribery of a public servant as proscribed in A.R.S. 13-2602, or knowingly commit commercial bribery as proscribed in A.R.S. 13-2605, or violate any Federal statute concerning bribery.
 - 5. A registrant shall comply with all Federal, State, and local building, fire, safety, real estate, and mining codes, and any other laws, codes, ordinances, or regulations pertaining to the registrant's professional practice.
 - 6. A registrant shall not violate any State or Federal criminal statute involving fraud, misrepresentation, embezzlement, theft, forgery, or breach of fiduciary duty, where the violation is related to the registrant's professional practice.
 - 7. A registrant shall apply the technical knowledge and skill which would be applied by other qualified registrants who practice the same profession; a contemporary "Manual of Surveying Instructions" issued by the Bureau of Land Management, United States Department of Interior and in effect prior to May 23, 1983 to the extent applicable to that professional engagement.
 - 8. A registrant shall not accept an assignment where the duty to a client or the public would conflict with the registrant's personal interest or the interest of another client without full disclosure of all material facts of the conflict to each person who might be related to or affected by the project or engagement in question.

- 9. A registrant shall not accept compensation for services related to the same project or professional engagement for more than one party without making full disclosure to all such parties and obtaining the express written consent of all parties involved.
- 10. Except as provided in Paragraph 11 of this rule, a registrant shall not accept any professional engagement or assignment outside his professional registration unless:
 - a. He is qualified by education, technical knowledge, or experience to perform such work, and
 - b. Such work is both necessary and incidental to the work of his profession on that specific engagement or assignment.

A registered professional engineer may accept professional engagements or assignments in branches of engineering other than that branch in which he has demonstrated proficiency by registration, but only if he has the education, technical knowledge, or experience to perform such engagements or assignments.

- 11. Except as otherwise provided by law, code, ordinance, or regulation, a registrant may act as the prime professional for a given project and select collaborating professionals; however, the registrant shall perform only those professional services for which he is qualified by registration to perform and shall seal and sign only the work prepared by him or by his bona fide employee working under his direct supervision.
- 12. A registrant shall make full disclosure to all parties concerning:
 - a. Any transaction involving payments to any person for the purpose of securing a contract, assignment, or engagement, except for actual and substantial technical assistance in preparing the proposal; or
 - b. Any monetary, financial, or beneficial interest the registrant may hold in a contracting firm or other entity providing goods or services, other than the registrant's professional services, to a project or engagement.
- 13. A registrant shall not solicit, receive, or accept compensation from material, equipment, or other product or services suppliers for specifying or endorsing their products, goods, or services to any client or other person without full written disclosure to all parties.

8/31/83 Supp. 834

APPENDIX B

LABOR COST ALLOCATION BUDGET

LABOR COST ALLOCATION BUDGET

SAMPLE

CONSULTANTS											
Person	Total Hourly R ate	1	2	3	4	5	6	7	8	Total Hours	Total Cost
(NAME)	\$0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	\$00.00
(NAME)	\$0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	\$00.00
(NAME)	\$0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	\$00.00
(NAME)	\$0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	\$00.00
Total Hours		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	\$00.00
Total Cost		\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	
Hours Inception to Date		0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	

EIMBURSABLE EXPENSES EXPENSES BY TASK									
Description	1	2	3	4	5	6	7	8	Total Cost
Office Supplies	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
Computer Time	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
Travel	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
Miscellaneous	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
*any other category as needed (e.g., aerial photos)	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
Total Reimbursable Expenses	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00

SUBCONTRACTORS	CONTRACTORS HOURS BY TASK									
Company	1	2	3	4	5	6	7	8	Total Cost	% of Grand Total
(NAME)	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	
(NAME)	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	
Total Cost	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	
Hours Inception to Date	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	0.00	

GRAND TOTAL TOTAL COSTS BY TASK										
Description		1	2	3	4	5	6	7	8	Total
Consultant Cost		\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
Reimbursable Expenses \$0		\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
Subcontractors		\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
Sub-Total		\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
Fee@	0.10	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00
GRAND TOTAL		\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00	\$0.00

APPENDIX C

PROPOSER'S REGISTRATION FORM

PROPOSER'S REGISTRATION FORM

All firms proposing as prime contractors or subcontractors on Maricopa Association of Governments (MAG) projects are required to be registered. **Please complete this form and return it with your proposal**.

If you have any questions about this registration form, please call Art Rullo, Fiscal Services Manager, (602) 254-6300.

GENERAL INFORMATION:
Name of Firm:
Street Address: City, State, ZIP
Mailing Address: City, State, ZIP
Telephone Number: Fax Number: E-mail address: Web address: Year firm was established:
Check all that apply: Is this firm a prime consultant? Is this firm a sub-consultant? Is this firm a certified DBE? Is this firm currently debarred? Is this firm currently the subject of debarment proceeding?
FINANCIAL INFORMATION
Firm's annual gross receipts (average of last 3 years):
Information will be maintained as confidential to the extent allowed by federal and state law The undersigned swears that the above information is correct. Any materia misrepresentation may be grounds for terminating any contract which may be awarded and initiating action under federal and state laws concerning false statements.
Name, Title Date

APPENDIX D

PROGRESS REPORT FORMAT

(Consultant's Letterhead) April 15, 2000

Maricopa Association of Governments 302 North First Avenue, Suite 300 Phoenix, Arizona 85007

Re: Progress Report No. 3 and Invoice for the Period of March 2000

For Each Task, the consultant is to provide the percent of work completed to date, a narrative describing the work accomplished, data obtained, problems encountered, meetings held and reports and/or data produced. It is the responsibility of the consultant to document that the work accomplished for each task during the reporting period is commensurate with the amount of money billed for the task in the invoice.

The narrative describing the work accomplished should be of sufficient detail to enable the Project Manager to clearly understand the progress on the task during the reporting period. Wherever possible, the consultant should submit along with the progress report appropriate documentation of work accomplished, such as partial or complete draft technical reports or working papers, etc.

TASK 1 - DATA COLLECTION

Percent of Work Completed: 100 percent.

Work Accomplished: An Airport database in both hard copy and electronic format was developed and a methodology for keeping the database current was established.

Data Obtained: Information on the airfield facilities, terminal facilities and navigation aids was secured for each of the 15 airports in the study area. The data included, but was not limited to: airport acreage, runway, taxiway and apron dimensions, navigation aids, terminal facilities, automobile parking, navigation aids, lighting and current and historical traffic levels.

Meetings Held: The following meetings were held in connection with the data collection effort:

March 15, 2000, with the Aviation Director of the City of Phoenix to review data collected for Phoenix Sky Harbor International Airport.

March 21, 2000, with the Aviation Advisory Committee to obtain input on the data collection process.

March 23, 2000, with MAG staff to review comments on preliminary database.

March 25, 2000, with Jim Redd of the Arizona Pilots Association to obtain input on the distribution of the database.

Reports or Data Produced: An airport database in electronic format was produced and provided to MAG staff on March 29, 2000.

TASK 2 - INVENTORY

Percent of Work Completed: 100 percent.

Work Accomplished: An airport inventory was completed, and the data obtained in Task 1 were compiled into a Draft Inventory Technical Report for distribution to the Aviation Advisory Committee.

Data Obtained: See Task 1.

Meetings Held: The following meetings were held:

March 1, 2000, met with MAG staff to finalize the outline for the Airport Inventory Technical Report.

March 10, 2000, met with the airport manager of Mesa Falcon Field to obtain suggestions on methods for comparing airport information.

Reports or Data Produced: A draft Airport Inventory Technical Report was produced and distributed to members of the aviation advisory committee for review and comment.

TASK 3 - FORECASTS

Percent of Work Completed: 100 percent.

Work Accomplished: Forecasts of based aircraft and aircraft operations for 15 airports were prepared for 1995, 2005 and 2015. The forecasts were consistent with County control totals of based aircraft reviewed by the Aviation Advisory Committee last month. The forecasts included a breakdown of based aircraft by aircraft type.

Data Obtained: See Task 1.

Meetings Held: March 21, 2000, met with MAG staff to discuss comments on preliminary forecast results.

Reports or Data Produced: A draft forecasts report was produced and distributed to members of the Aviation Advisory Committee for review and comment.

TASK 4 - DEMAND/CAPACITY ANALYSIS AND FACILITY REQUIREMENTS

Percent of Work Completed: 60 percent.

Work Accomplished: For each of the 15 MAG airports an Annual Service Volume (annual airport capacity) and an hourly capacity was computed using the guidance provided in FAA Advisory Circular 150-5060-5.

Data Obtained: See Task 1.

Meetings Held: A meeting was held with Aeronautics Division staff on March 25, 2000 to determine the cause of discrepancies between the capacity calculations in the MAG Regional Aviation System Plan Update and the State Airport System Plan. Some discrepancies were attributed to different data input; others to the methodology used to compute the estimate. Agreement was reached on resolving the discrepancy by both plans using the same data input assumptions, and the State updating their procedure for computing capacity.

Reports or Data Produced: None. However, a draft set of airport capacity estimates is enclosed documenting the assumptions and data input used to prepare the estimates.

TASK 5- ALTERNATIVES

Percent of Work Completed: 25 percent.

Work Accomplished: Other regional aviation systems plans were examined to determine the type of alternatives that were used to meet future demand.

Data Obtained: Regional Aviation System Plans from San Diego, Los Angeles, Denver, Seattle Tucson and Chicago were collected.

Meetings Held: On March 18, 2000, a meeting was held with the Aviation Planner for the Pima Association of Governments to discuss alternatives included in the Tucson Regional Airport Plan.

Reports or Data Produced: None.

TASK 6 - EVALUATION OF ALTERNATIVES

Work on this task has not begun.

TASK 7 - RECOMMENDATIONS

Work on this task has not begun.

TASK 8 - IMPLEMENTATION

Work on this task has not begun.

Problems Encountered

There was difficulty calculating the apron dimensions for the airports because sponsors define the apron area differently, and not all sponsors keep data on the size of the apron in terms of square feet. To insure consistency among the data a methodology was developed for calculating apron space after consultation with MAG staff and members of the Aviation Advisory Committee. The sum of the individual airport forecasts exceeded the County control totals for based aircraft. The based aircraft forecasts by airport had to be revised to be consistent with the control totals. Some of the

capacity calculations prepared for the study were different from the capacity calculations included in the State Airport System Plan. The problem was resolved at a meeting held with the Aeronautics Division staff on March 25, 2000.

Invoice

The enclosed invoice is for the third progress payment of \$17,679.20. The total amount billed to date is \$48,250.00.

Sincerely,

Project Manager Name Project Manager Title

Enclosure